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Conversation calls time on centre staff

JENNIFER FORESHEW ARTIFICIAL INTELLIGENCE

AN intelligent system that can recreate normal conversation and potentially replace human call centre staff will be tested in collaboration with Telstra.

A team from Melbourne's RMIT University has developed a prototype of the Open-ended Conversational System that fuses software agents and knowledge engineering.

Project co-manager John Thangarajah said the system could be more efficient and also cheaper than a call centre or a normal online search. "The idea is that you are able to satisfy your information needs through a conversation and the system will understand what you are saying and retain the context as the conversation goes along," he said.

"If you went to Google and searched for something you get a response, but then if you want to ask another question you have got to type a different search and you have got to put all your key words in again," Dr Thangarajah said. "So you can't really have a conversation with Google, for example."

The project, developed by a team from the School of Computer Science and IT, won the

Telstra Innovation Challenge late last year.

Dr Thangarajah, who specialises in intelligent systems — smart software that carries out human-like "thought" processes — said the system could be used as an initial step to satisfy customer queries. "I don't think it will completely replace staff; it might, but there is a long way to go."

He said the system went even further than iOS personal assistant application Siri, which had a more limited conversation capability. "There is nothing to the extent of what we are talking about where you can have a conversation and have your information needs satisfied," said Dr Thangarajah, who is a senior lecturer at the school.

The team included industry sponsor and intelligent speech and dialogue systems specialist Real Thing Entertainment, Dr Wilson Wong and project leader Professor Lin Padgham.

The system had the potential to be used in both ICT and health.

"Any system, really, where you have people asking questions and require answers," he said. "The unique thing about it also is that it works on existing data.

"So what our system does is actually trawl question and answer pairs and find the most appropriate answer to give back to the user." As reward for winning the event, Telstra will provide the RMIT project with access to generic mobile and broadband question and answer support information, as well as to domain experts for advice and testing purposes.

Telstra will also provide access to cloud infrastructure for web hosting and mobile computing platforms for testing the Openended Conversational System.

Dr Thangarajah said there were several venture capitalists interested in the system, but Telstra held first right to negotiate any potential commercialisation, which was expected to be at least a year or two away.